FlyBy Math™ Alignment
Michigan Mathematics
Grade Level Content Expectations v.6.04

Strand: Number and Operations

Solve decimal, percentage and rational number problems

Grade Level Content Expectation	*FlyBy Math*™ Activities
N.FL.06.14 For applied situations, estimate the answers to calculations involving operations with rational numbers.	--Use calculations and experimental evidence to predict, describe, and explain several aircraft conflict problems.
N.FL.06.15 Solve applied problems that use the four operations with appropriate decimal numbers.	--Use calculations and experimental evidence to predict, describe, and explain several aircraft conflict problems.

Strand: Algebra

Calculate rates

Grade Level Content Expectation	*FlyBy Math*™ Activities
A.PA.06.01 Solve applied problems involving rates including speed, e.g., if a car is going 50 mph, how far will it go in 3__ hours?	--Represent distance, speed, and time relationship for constant speed cases using tables, bar graphs, line graphs, equations, and a Cartesian coordinate system. --Use formulas and graphs to solve and analyze aircraft conflict problems and to communicate results.

Understand the coordinate plane

Grade Level Content Expectation	*FlyBy Math*™ Activities
A.RP.06.02 Plot ordered pairs of integers and use ordered pairs of integers to identify points in all four quadrants of the coordinate plane.	--Plot points on a schematic of a jet route, on a vertical line graph, and on a Cartesian coordinate system to describe the motion of two airplanes.

Represent linear functions using tables, equations, and graphs

Grade Level Content Expectation	*FlyBy Math*™ Activities
A.RP.06.08 Understand that relationships between quantities can be suggested by graphs and tables.	--Represent distance, speed, and time relationship for constant speed cases using tables, bar graphs, line graphs, equations, and a Cartesian coordinate system. --Use tables, bar graphs, line graphs, a Cartesian coordinate system, and equations to model aircraft conflicts and predict outcomes.

A.PA.06.09 Graph and write equations for linear functions of the form y = mx, and solve related problems, e.g., given n chairs, the "leg function" is f(n) = 4n; if you have 5 chairs, how many legs?; if you have 12 legs, how many chairs?	--Represent distance, speed, and time relationship for constant speed cases using tables, bar graphs, line graphs, equations, and a Cartesian coordinate system. --Use graphs to compare airspace scenarios for both the same and different starting conditions and the same and different constant (fixed) rates.
A.RP.06.10 Represent simple relationships between quantities, using verbal descriptions, formulas or equations, tables, and graphs, e.g., perimeter-side relationship for a square, distance-time graphs, and conversions such as feet to inches.	--Represent distance, speed, and time relationship for constant speed cases using tables, bar graphs, line graphs, equations, and a Cartesian coordinate system.